

IN THE CLAIMS

1. (Currently amended) A data transfer device which comprises:

acquisition means for acquiring plural pieces of area information including an area address and area length on the basis of an address of an area table in which plural pieces of said area information are written, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer is issued,

transfer information setting means for setting transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of said area information of [[area]] areas as transfer destination [[area]] areas,

judging means for judging whether [[said]] a transfer destination area and [[other]] another transfer destination area form a continuous area where plural areas are consecutive,

transfer information changing means for changing said transfer information according to said continuous area when it is judged by said judging means that said transfer destination area and [[other]] another transfer destination area form said continuous area, and

data transfer control means for controlling the transfer of data on the basis of said transfer information.

2. (Currently amended) The data transfer device as defined in claim 1 wherein said transfer information changing means changes the transfer data length of said transfer information to a value obtained by adding the area length of said [[other]] another transfer destination area to the transfer data length of said transfer information.

3. (Original) The data transfer device as defined in claim 1 wherein said acquisition means acquires plural pieces of said area information by the lump.

4. (Currently amended) The data transfer device as defined in claim 3 which further comprises arranging means for arranging said pieces of area information acquired by said acquisition means according to increasing order of area address and wherein said judging means judges according to the order of arrangement by said arranging means whether said transfer destination area and [[other]] another transfer destination area form said continuous area.

5. (Currently amended) A data transfer device which comprises:

acquisition means for acquiring plural pieces of area information including an area address and area length on the basis of an address of an area table in which plural pieces of said area information are written, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer is issued, wherein said acquisition means acquires plural pieces of said area information by the lump,

transfer information setting means for setting transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of said area information of [[area]] areas as transfer destination [[area]] areas,

judging means for judging whether [[said]] a transfer destination area and [[other]] another transfer destination area form a continuous area where plural areas are consecutive,

transfer information changing means for changing said transfer information according to said continuous area when it is judged by said judging means that said transfer destination area and [[other]] another transfer destination area form said continuous area,

data transfer control means for controlling the transfer of data on the basis of said transfer information,

previous area information memorizing means for memorizing said area information acquired on a previous instruction requesting the data transfer, and

area information judging means for judging whether said previous area information memorized in the previous area information memorizing means agrees with said area information acquired by said acquisition means on said latest instruction requesting the data transfer,

wherein in areas where said area information judging means judges that said previous area information agrees with said area information newly acquired, said data transfer control means controls the data transfer in the same way as for the previous transfer.

6. (Currently amended) A data transfer method which comprises the steps of:

acquiring plural pieces of area information including an area address and area length on the basis of an address of an area table in which plural pieces of said area information are written, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer,

setting transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of said area information of [[area]] areas as transfer destination [[area]] areas,

judging whether [[said]] a transfer destination area and [[other]] another transfer destination area form a continuous area where plural areas are consecutive,

changing said transfer information according to said continuous area when it is judged by said judging means that said transfer destination area and [[other]] another transfer destination area form said continuous area, and

controlling the transfer of data on the basis of said transfer information.

7. (Currently amended) A data transfer program to have a computer execute the steps of:
acquiring plural pieces of area information including an area address and area length on the basis of an address of an area table in which plural pieces of said area information are written, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer,

setting transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of said area information of [[area]] areas as transfer destination [[area]] areas,

judging whether [[said]] a transfer destination area and [[other]] another transfer destination area form a continuous area where plural areas are consecutive,

changing said transfer information according to said continuous area when it is judged by said judging means that said transfer destination area and [[other]] another transfer destination area form said continuous area, and

controlling the transfer of data on the basis of said transfer information.

8. (Currently amended) A computer readable storage medium storing a data transfer program to have a computer execute the steps of:

acquiring plural pieces of area information including an area address and area length on the basis of an address of an area table in which plural pieces of said area information are written, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer,

setting transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of said area information of [[area]] areas as transfer destination [[area]] areas,

judging whether [[said]] a transfer destination area and [[other]] another transfer destination area form a continuous area where plural areas are consecutive,

changing said transfer information according to said continuous area when it is judged by said judging means that said transfer destination area and [[other]] another transfer destination area form said continuous area, and

controlling the transfer of data on the basis of said transfer information.

9. (Previously presented): A data transfer device which comprises:

an acquisition unit configured to acquire plural pieces of area information which are written in an area table, on the basis of an address of the area table, when an instruction requesting data transfer to specify the address of the area table as destination of requested data transfer is issued, wherein the area information includes an area address and area length,

a transfer information setting unit configured to set transfer information including an address of transfer source, a transfer data length and an address of transfer destination of data on the basis of each pieces of the area information of areas as transfer destination areas,

a judging unit configured to judge whether a transfer destination area and another transfer destination area form a continuous area where plural areas are consecutive,

a transfer information changing unit configured to change the transfer information according to the continuous area when it is judged by said judging means that said transfer destination area and another transfer destination area form the continuous area, and

data transfer control unit configured to control the transfer of data on the basis of the set or changed transfer information.